

THE LIFE HISTORY OF *TOXIDIA INORNATA INORNATA*
(BUTLER) (LEPIDOPTERA: HESPERIIDAE: TRAPEZITINAE)

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Abstract

The early stages of *Toxidia inornata inornata* (Butler) are described. The larval food plant at Iron Range is an unidentified species of wire grass, *Tetrarrhena* sp. (Poaceae).

Introduction

Toxidia inornata inornata (Butler) occurs in the Kai and Aru Is of Indonesia and in northern Queensland, Australia (Braby 2000). Known Queensland localities are all in Cape York Peninsula: Jardine River basin (Moulds and D'Apice 1982), Captain Billy Creek (Monteith and Hancock 1977), Iron Range (Kerr 1966) and McIlwraith Range near Coen (Eastwood 1995).

At Iron Range, a female was observed depositing a single egg on the leaf of a climber (Matchbox Bean, *Entada phaseoloides*: Fabaceae). This vine was trailing through grass beside a track in rainforest. The egg and piece of vine were collected but, as this seemed an unlikely larval food plant, samples of the grasses growing in the immediate vicinity were also collected. On hatching, the larva left the vine and fed on a wire grass. Females subsequently collected and sleeved with this grass oviposited readily.

Life history

Larval food plant. Wire grass, *Tetrarrhena* sp. (Poaceae).

Egg. Diameter 0.5 mm. Green; dome-shaped, with barely discernible vertical ribs.

First instar larva. Length 3 mm. Head shiny black; round and smooth. Body green; smooth and finely haired.

Final instar larva (Fig. 1). Length 21 mm. Head shiny black with two pale white lateral markings; rounded with very shallow dorsal groove; smooth but finely pitted. Body smooth; translucent green with a reddish tinge that is palest at the centre and darker towards the ends, with prominent whitish dorsal and dorsolateral lines and an indistinct lateral line.

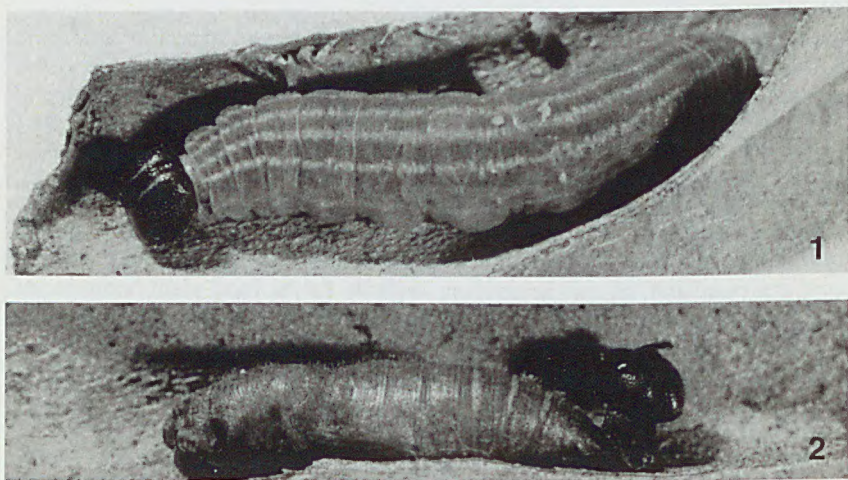
Pupa (Fig. 2). Length 14 mm. Uniformly pale brown; smooth and shiny except wing cases covered with short setae; sculpturing unremarkable; frons rounded; thoracic spiracles black. Attached by cremaster to silken pad.

Discussion

Eggs are laid singly either on the food plant or on nearby material. In captivity, early instar larvae rested on the upper leaf surface of the food plant, rarely producing shelters. When shelters were constructed they were very

rudimentary, consisting of fine silken threads partially folding in the leaf margins. Later instars shelter in debris at the base of the food plant. They were not observed to produce shelters but utilised naturally occurring rounded leaves or bark in which to rest or pupate. In Figure 2, a section of the bark has been removed to expose the pupa.

Toxidia inornata inornata is a rainforest species that usually flies close to the ground. It occurs throughout the year but is most common after the wet season when wire grass is at maximum growth. Eggs laid in mid September produced adults in mid January. Pupal duration was 12 days.



Figs 1-2. *Toxidia inornata inornata*. (1) final instar larva; (2) pupa.

Acknowledgement

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References

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